



# SAFETY DATA SHEET

Product name: AchievAL Enviro HD 46

Issue Date: 06/28/2021

Print Date: 07/06/2021

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## 1. IDENTIFICATION

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Product name: AchievAL Enviro HD 46

### Recommended use of the chemical and restrictions on use

**Identified uses:** Selection of the appropriate polyglycol product for a specific application requires knowledge of the fluid requirements of the application, awareness of the most important of these requirements, and a match-up with the properties of the various polyglycol materials. Polyglycol products can be formulated for use in numerous industry applications such as hydraulic fluids, quenchants, compressor and refrigeration lubricants, heat transfer fluids, machinery lubricants, solder assist fluids, metalworking lubricants, textile finishing, etc. We recommend that you use this product in a manner consistent with the listed use. If your intended use is not consistent with the stated use, please contact your sales or technical service representative.

### COMPANY IDENTIFICATION

KOST USA, Inc  
1000 Tennessee Ave  
Cincinnati, OH 45229  
513-492-5555

Customer Information Number:

800-661-9391  
[www.kostusa.com](http://www.kostusa.com)

### EMERGENCY TELEPHONE NUMBER

24-Hour Emergency Contact: CHEMTREC +1 800-424-9300

Local Emergency Contact: 800-424-9300

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## 2. HAZARDS IDENTIFICATION

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### Hazard classification

GHS classification in accordance with the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Reproductive toxicity - Category 2

### Label elements

Hazard pictograms



Signal word: **WARNING!**

**Hazards**

Suspected of damaging fertility or the unborn child.

**Precautionary statements****Prevention**

Obtain special instructions before use.

Do not handle until all safety precautions have been read and understood.

Wear protective gloves, protective clothing, eye protection and/or face protection.

**Response**

IF exposed or concerned: Get medical advice/ attention.

**Storage**

Store locked up.

**Disposal**

Dispose of contents and/or container to an approved waste disposal plant.

**Other hazards**

No data available

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**3. COMPOSITION/INFORMATION ON INGREDIENTS**

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This product is a mixture.

<b>Component</b>	<b>CASRN</b>	<b>Concentration</b>
Polyalkylene glycol 1	Trade secret	> 55.0 - < 65.0 %
Polyalkylene glycol 2	Trade secret	> 35.0 - < 45.0 %
Aromatic Amine 1	Trade secret	< 2.0 %
Aromatic Amine 2	Trade secret	< 2.0 %
Tolyl triazole	29385-43-1	>= 0.1 - < 1.0 %

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## 4. FIRST AID MEASURES

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### Description of first aid measures

#### General advice:

If potential for exposure exists refer to Section 8 for specific personal protective equipment.

**Inhalation:** Move person to fresh air and keep comfortable for breathing; consult a physician.

**Skin contact:** Wash off with plenty of water.

**Eye contact:** Flush eyes thoroughly with water for several minutes. Remove contact lenses after the initial 1-2 minutes and continue flushing for several additional minutes. If effects occur, consult a physician, preferably an ophthalmologist.

**Ingestion:** Rinse mouth with water. No emergency medical treatment necessary.

#### Most important symptoms and effects, both acute and delayed:

Aside from the information found under Description of first aid measures (above) and Indication of immediate medical attention and special treatment needed (below), any additional important symptoms and effects are described in Section 11: Toxicology Information.

#### Indication of any immediate medical attention and special treatment needed

**Notes to physician:** No specific antidote. Treatment of exposure should be directed at the control of symptoms and the clinical condition of the patient.

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## 5. FIREFIGHTING MEASURES

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### Extinguishing media

**Suitable extinguishing media:** Water fog or fine spray.. Dry chemical fire extinguishers.. Carbon dioxide fire extinguishers.. Foam.. Alcohol resistant foams (ATC type) are preferred. General purpose synthetic foams (including AFFF) or protein foams may function, but will be less effective..

**Unsuitable extinguishing media:** Do not use direct water stream.. May spread fire..

### Special hazards arising from the substance or mixture

**Hazardous combustion products:** During a fire, smoke may contain the original material in addition to combustion products of varying composition which may be toxic and/or irritating.. Combustion products may include and are not limited to: Carbon monoxide.. Carbon dioxide.. Combustion products may include trace amounts of: Nitrogen oxides..

**Unusual Fire and Explosion Hazards:** Container may rupture from gas generation in a fire situation.. Violent steam generation or eruption may occur upon application of direct water stream to hot liquids..

### Advice for firefighters

**Fire Fighting Procedures:** Keep people away. Isolate fire and deny unnecessary entry.. Use water spray to cool fire exposed containers and fire affected zone until fire is out and danger of reignition has passed.. Fight fire from protected location or safe distance. Consider

the use of unmanned hose holders or monitor nozzles.. Immediately withdraw all personnel from the area in case of rising sound from venting safety device or discoloration of the container.. Burning liquids may be extinguished by dilution with water.. Do not use direct water stream. May spread fire.. Move container from fire area if this is possible without hazard.. Burning liquids may be moved by flushing with water to protect personnel and minimize property damage..

**Special protective equipment for firefighters:** Wear positive-pressure self-contained breathing apparatus (SCBA) and protective fire fighting clothing (includes fire fighting helmet, coat, trousers, boots, and gloves).. If protective equipment is not available or not used, fight fire from a protected location or safe distance..

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## 6. ACCIDENTAL RELEASE MEASURES

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**Personal precautions, protective equipment and emergency procedures:** Use appropriate safety equipment. For additional information, refer to Section 8, Exposure Controls and Personal Protection. Refer to section 7, Handling, for additional precautionary measures.

**Environmental precautions:** Prevent from entering into soil, ditches, sewers, waterways and/or groundwater. See Section 12, Ecological Information.

**Methods and materials for containment and cleaning up:** Contain spilled material if possible. Collect in suitable and properly labeled containers. See Section 13, Disposal Considerations, for additional information.

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## 7. HANDLING AND STORAGE

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**Precautions for safe handling:** Avoid breathing mist. Use with adequate ventilation. Keep container closed. See Section 8, EXPOSURE CONTROLS AND PERSONAL PROTECTION.

Do not use sodium nitrite or other nitrosating agents in formulations containing this product. Suspected cancer-causing nitrosamines could be formed. Spills of these organic materials on hot fibrous insulations may lead to lowering of the autoignition temperatures possibly resulting in spontaneous combustion.

**Conditions for safe storage:** Store in the following material(s): 316 stainless steel. Carbon steel. Glass-lined container. Polypropylene. Polyethylene-lined container. Stainless steel. Teflon. This material may soften and lift certain paint and surface coatings. Use product promptly after opening. Store in original unopened container. Unopened containers of material stored beyond the recommended shelf life should be retested against the sales specifications before use. Additional storage and handling information on this product may be obtained by calling your sales or customer service contact.

### Storage stability

**Shelf life: Use within**  
24 Month

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## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

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### Control parameters

If exposure limits exist, they are listed below. If no exposure limits are displayed, then no values are applicable.

### Exposure controls

**Engineering controls:** Use local exhaust ventilation, or other engineering controls to maintain airborne levels below exposure limit requirements or guidelines. If there are no applicable exposure limit requirements or guidelines, general ventilation should be sufficient for most operations. Local exhaust ventilation may be necessary for some operations.

### Individual protection measures

**Eye/face protection:** Use safety glasses (with side shields).

#### Skin protection

**Hand protection:** Use gloves chemically resistant to this material when prolonged or frequently repeated contact could occur. Examples of preferred glove barrier materials include: Butyl rubber. Ethyl vinyl alcohol laminate ("EVAL"). Examples of acceptable glove barrier materials include: Neoprene. Nitrile/butadiene rubber ("nitrile" or "NBR"). NOTICE: The selection of a specific glove for a particular application and duration of use in a workplace should also take into account all relevant workplace factors such as, but not limited to: Other chemicals which may be handled, physical requirements (cut/puncture protection, dexterity, thermal protection), potential body reactions to glove materials, as well as the instructions/specifications provided by the glove supplier.

**Other protection:** Wear clean, body-covering clothing.

**Respiratory protection:** Under intended handling conditions, no respiratory protection should be needed.

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## 9. PHYSICAL AND CHEMICAL PROPERTIES

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### Appearance

Physical state	Liquid.
Color	Yellow to orange
Odor	Mild
Odor Threshold	No test data available
pH	No test data available
Melting point/range	No test data available
Freezing point	See Pour Point
Boiling point (760 mmHg)	> 200 °C (> 392 °F) <i>Calculated.</i>
Flash point	<b>closed cup</b> 223.8 °C (434.8 °F) <i>ASTM D 93</i>
Evaporation Rate (Butyl Acetate = 1)	No test data available
Flammability (solid, gas)	Not applicable to liquids
Flammability (liquids)	Not expected to be a static-accumulating flammable liquid.
Lower explosion limit	No test data available
Upper explosion limit	No test data available

<b>Vapor Pressure</b>	< 0.01 mmHg at 20 °C (68 °F) <i>ASTM E1719</i>
<b>Relative Vapor Density (air = 1)</b>	>10 <i>Calculated.</i>
<b>Relative Density (water = 1)</b>	1.035 at 20 °C (68 °F) / 20 °C <i>Calculated.</i>
<b>Water solubility</b>	<i>Visual</i> completely soluble
<b>Partition coefficient: n-octanol/water</b>	No data available
<b>Auto-ignition temperature</b>	No test data available
<b>Decomposition temperature</b>	No test data available
<b>Kinematic Viscosity</b>	42.6 - 49.5 cSt at 40 °C (104 °F) <i>ASTM D 445</i>
<b>Explosive properties</b>	No data available
<b>Oxidizing properties</b>	No data available
<b>Molecular weight</b>	No data available
<b>Molecular formula</b>	Trade secret
<b>Pour point</b>	-51 °C (-60 °F) <i>ASTM D97</i>
<b>Volatile Organic Compounds</b>	0.0 g/L <i>EPA Method No. 24</i>

NOTE: The physical data presented above are typical values and should not be construed as a specification.

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## 10. STABILITY AND REACTIVITY

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**Reactivity:** No data available

**Chemical stability:** Thermally stable at typical use temperatures.

**Possibility of hazardous reactions:** Polymerization will not occur.

**Conditions to avoid:** Exposure to elevated temperatures can cause product to decompose. Generation of gas during decomposition can cause pressure in closed systems.

**Incompatible materials:** Avoid contact with: Strong acids. Strong bases. Strong oxidizers.

**Hazardous decomposition products:** Decomposition products depend upon temperature, air supply and the presence of other materials.. Decomposition products can include and are not limited to:.. Aldehydes.. Alcohols.. Ethers.. Hydrocarbons.. Ketones.. Organic acids.. Polymer fragments..

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## 11. TOXICOLOGICAL INFORMATION

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*Toxicological information appears in this section when such data is available.*

### Information on likely routes of exposure

Ingestion, Inhalation, Skin contact, Eye contact.

**Acute toxicity (represents short term exposures with immediate effects - no chronic/delayed effects known unless otherwise noted)**

#### Acute oral toxicity

Very low toxicity if swallowed. Harmful effects not anticipated from swallowing small amounts.

As product: Single dose oral LD50 has not been determined.

Based on information for component(s):  
LD50, Rat, > 5,000 mg/kg Estimated.

**Information for components:**

**Polyalkylene glycol 1**

LD50, Rat, > 7,000 mg/kg

**Polyalkylene glycol 2**

Single dose oral LD50 has not been determined.

For similar material(s): LD50, Rat, > 7,000 mg/kg

**Aromatic Amine 1**

LD50, Rat, > 2,500 mg/kg

**Aromatic Amine 2**

LD50, Rat, 12,650 mg/kg

**Tolyl triazole**

LD50, Rat, male and female, 720 mg/kg OECD Test Guideline 401

**Acute dermal toxicity**

Prolonged skin contact is unlikely to result in absorption of harmful amounts.

As product: The dermal LD50 has not been determined.

Based on information for component(s):  
LD50, Rabbit, > 5,000 mg/kg Estimated.

**Information for components:**

**Polyalkylene glycol 1**

LD50, Rabbit, > 20,000 mg/kg

**Polyalkylene glycol 2**

The dermal LD50 has not been determined.

For similar material(s): LD50, Rabbit, > 20,000 mg/kg

**Aromatic Amine 1**

The dermal LD50 has not been determined.

**Aromatic Amine 2**

The dermal LD50 has not been determined.

**Tolyl triazole**

LD50, Rabbit, > 5,000 mg/kg

**Acute inhalation toxicity**

At room temperature, exposure to vapor is minimal due to low volatility; single exposure is not likely to be hazardous. For respiratory irritation and narcotic effects: No relevant data found.

As product: The LC50 has not been determined.

**Information for components:**

**Polyalkylene glycol 1**

For similar material(s): LC50, Rat, 4 Hour, dust/mist, > 5.01 mg/l No deaths occurred at this concentration.

**Polyalkylene glycol 2**

At room temperature, exposure to vapor is minimal due to low volatility; single exposure is not likely to be hazardous. For respiratory irritation and narcotic effects: No relevant data found.

LC50, Rat, male, 4 Hour, dust/mist, > 5.01 mg/l No deaths occurred at this concentration.

**Aromatic Amine 1**

Vapor from heated material may cause respiratory irritation.

The LC50 has not been determined.

**Aromatic Amine 2**

LC50, 4 Hour, dust/mist, > 0.4 mg/l No deaths occurred following exposure to a saturated atmosphere.

**Tolyl triazole**

The LC50 has not been determined.

**Skin corrosion/irritation**

Based on information for component(s):  
Brief contact is essentially nonirritating to skin.

**Information for components:**

**Polyalkylene glycol 1**

Brief contact is essentially nonirritating to skin.

**Polyalkylene glycol 2**

Brief contact is essentially nonirritating to skin.

**Aromatic Amine 1**

Prolonged contact may cause skin irritation with local redness.

**Aromatic Amine 2**

Essentially nonirritating to skin.

**Tolyl triazole**

Brief contact is essentially nonirritating to skin.

**Serious eye damage/eye irritation**

Based on information for component(s):



May cause slight temporary eye irritation.  
Corneal injury is unlikely.

**Information for components:**

**Polyalkylene glycol 1**

May cause slight temporary eye irritation.  
Corneal injury is unlikely.

**Polyalkylene glycol 2**

May cause slight temporary eye irritation.  
Corneal injury is unlikely.

**Aromatic Amine 1**

May cause slight eye irritation.

**Aromatic Amine 2**

Essentially nonirritating to eyes.

**Tolyl triazole**

May cause slight eye irritation.

**Sensitization**

For the component(s) tested:

Did not cause allergic skin reactions when tested in humans.

For respiratory sensitization:

No relevant data found.

**Information for components:**

**Polyalkylene glycol 1**

For skin sensitization:  
No relevant data found.

For respiratory sensitization:

No relevant data found.

**Polyalkylene glycol 2**

For skin sensitization:  
No relevant data found.

For respiratory sensitization:

No relevant data found.

**Aromatic Amine 1**

For skin sensitization:  
No relevant data found.

For respiratory sensitization:

No relevant data found.

**Aromatic Amine 2**

Did not cause allergic skin reactions when tested in guinea pigs.

For respiratory sensitization:  
No relevant data found.

**Tolyl triazole**

Did not cause allergic skin reactions when tested in guinea pigs.

For respiratory sensitization:  
No relevant data found.

**Specific Target Organ Systemic Toxicity (Single Exposure)**

Evaluation of available data suggests that this material is not an STOT-SE toxicant.

**Information for components:**

**Polyalkylene glycol 1**

Evaluation of available data suggests that this material is not an STOT-SE toxicant.

**Polyalkylene glycol 2**

Evaluation of available data suggests that this material is not an STOT-SE toxicant.

**Aromatic Amine 1**

Available data are inadequate to determine single exposure specific target organ toxicity.

**Aromatic Amine 2**

Available data are inadequate to determine single exposure specific target organ toxicity.

**Tolyl triazole**

Evaluation of available data suggests that this material is not an STOT-SE toxicant.

**Aspiration Hazard**

Based on physical properties, not likely to be an aspiration hazard.

**Information for components:**

**Polyalkylene glycol 1**

Based on physical properties, not likely to be an aspiration hazard.

**Polyalkylene glycol 2**

Based on physical properties, not likely to be an aspiration hazard.

**Aromatic Amine 1**

Based on available information, aspiration hazard could not be determined.

**Aromatic Amine 2**

Based on available information, aspiration hazard could not be determined.

**Tolyl triazole**

Based on physical properties, not likely to be an aspiration hazard.

**Chronic toxicity (represents longer term exposures with repeated dose resulting in chronic/delayed effects - no immediate effects known unless otherwise noted)**

**Specific Target Organ Systemic Toxicity (Repeated Exposure)**

Based on information for component(s):

Mist may cause irritation of upper respiratory tract (nose and throat) and lungs.

**Information for components:**

**Polyalkylene glycol 1**

Mist may cause irritation of upper respiratory tract (nose and throat) and lungs.

**Polyalkylene glycol 2**

For similar material(s):

Mist may cause irritation of upper respiratory tract (nose and throat) and lungs.

**Aromatic Amine 1**

No relevant data found.

**Aromatic Amine 2**

No relevant data found.

**Tolyl triazole**

Based on available data, repeated exposures are not anticipated to cause significant adverse effects.

**Carcinogenicity**

Contains component(s) which did not cause cancer in laboratory animals.

**Information for components:**

**Polyalkylene glycol 1**

Did not cause cancer in laboratory animals.

**Polyalkylene glycol 2**

Similar material(s) did not cause cancer in laboratory animals.

**Aromatic Amine 1**

No relevant data found.

**Aromatic Amine 2**

No relevant data found.

**Tolyl triazole**

No relevant data found.

**Teratogenicity**

Contains component(s) which caused birth defects in laboratory animals.

**Information for components:**

**Polyalkylene glycol 1**

No relevant data found.

**Polyalkylene glycol 2**

No relevant data found.

**Aromatic Amine 1**

Did not cause birth defects or any other fetal effects in laboratory animals.

**Aromatic Amine 2**

No relevant data found.

**Tolyl triazole**

Has caused birth defects in laboratory animals.

**Reproductive toxicity**

No specific, relevant data available for assessment.

**Information for components:**

**Polyalkylene glycol 1**

No relevant data found.

**Polyalkylene glycol 2**

No relevant data found.

**Aromatic Amine 1**

No relevant data found.

**Aromatic Amine 2**

No relevant data found.

**Tolyl triazole**

No relevant data found.

**Mutagenicity**

No specific, relevant data available for assessment.

**Information for components:**

**Polyalkylene glycol 1**

No relevant data found.

**Polyalkylene glycol 2**

No relevant data found.

**Aromatic Amine 1**

In vitro genetic toxicity studies were negative. Animal genetic toxicity studies were negative.

**Aromatic Amine 2**

In vitro genetic toxicity studies were negative.

**Tolyl triazole**

In vitro genetic toxicity studies were negative. Animal genetic toxicity studies were negative.

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## 12. ECOLOGICAL INFORMATION

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*Ecotoxicological information appears in this section when such data is available.*

**Toxicity****Acute toxicity to fish**

Material is practically non-toxic to aquatic organisms on an acute basis (LC50/EC50/EL50/LL50 >100 mg/L in the most sensitive species tested).

LL50, Pimephales promelas (fathead minnow), semi-static test, 96 Hour, 297 mg/l, OECD Test Guideline 203 or Equivalent

**Acute toxicity to aquatic invertebrates**

EC50, Daphnia magna (Water flea), static test, 48 Hour, 430 mg/l, OECD Test Guideline 202 or Equivalent

**Persistence and degradability**

**Biodegradability:** Material is readily biodegradable. Passes OECD test(s) for ready biodegradability.

10-day Window: Pass

**Biodegradation:** 72 %

**Exposure time:** 28 d

**Method:** OECD Test Guideline 301F or Equivalent

10-day Window: Pass

**Biodegradation:** 67.8 %

**Exposure time:** 28 d

**Method:** OECD Test Guideline 301D or Equivalent

**Bioaccumulative potential**

**Bioaccumulation:** No bioconcentration is expected because of the relatively high water solubility.

**Mobility in soil**

No relevant data found.

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**13. DISPOSAL CONSIDERATIONS**

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**Disposal methods:** DO NOT DUMP INTO ANY SEWERS, ON THE GROUND, OR INTO ANY BODY OF WATER. All disposal practices must be in compliance with all Federal, State/Provincial and local laws and regulations. Regulations may vary in different locations. Waste characterizations and compliance with applicable laws are the responsibility solely of the waste generator. AS YOUR SUPPLIER, WE HAVE NO CONTROL OVER THE MANAGEMENT PRACTICES OR MANUFACTURING PROCESSES OF PARTIES HANDLING OR USING THIS MATERIAL. THE INFORMATION PRESENTED HERE PERTAINS ONLY TO THE PRODUCT AS SHIPPED IN ITS INTENDED CONDITION AS DESCRIBED IN MSDS SECTION: Composition Information. FOR UNUSED & UNCONTAMINATED PRODUCT, the preferred options include sending to a licensed, permitted: Incinerator or other thermal destruction device.

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**14. TRANSPORT INFORMATION**

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**DOT**

Not regulated for transport

**Classification for SEA transport (IMO-IMDG):**

**Transport in bulk according to Annex I or II of MARPOL 73/78 and the IBC or IGC Code**

Not regulated for transport  
Consult IMO regulations before transporting ocean bulk

**Classification for AIR transport (IATA/ICAO):**

Not regulated for transport

This information is not intended to convey all specific regulatory or operational requirements/information relating to this product. Transportation classifications may vary by container volume and may be influenced by regional or country variations in regulations. Additional transportation system information can be obtained through an authorized sales or customer service representative. It is the responsibility of the transporting organization to follow all applicable laws, regulations and rules relating to the transportation of the material.

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## **15. REGULATORY INFORMATION**

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**Superfund Amendments and Reauthorization Act of 1986 Title III (Emergency Planning and Community Right-to-Know Act of 1986) Sections 311 and 312**

Reproductive toxicity

**Superfund Amendments and Reauthorization Act of 1986 Title III (Emergency Planning and Community Right-to-Know Act of 1986) Section 313**

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

**Pennsylvania Worker and Community Right-To-Know Act:**

To the best of our knowledge, this product does not contain chemicals at levels which require reporting under this statute.

**California Prop. 65**

This product contains a chemical that is at or below California Propositions 65's "safe harbor level" as determined via a risk assessment. Therefore, the chemical is not required to be listed as a Prop 65 chemical on the SDS or label.

**United States TSCA Inventory (TSCA)**

All components of this product are in compliance with the inventory listing requirements of the U.S. Toxic Substances Control Act (TSCA) Chemical Substance Inventory.

## 16. OTHER INFORMATION

### Other information

This product is FM Approved or Specification Tested. Any further blending or handling (re-packaging and/or re-labeling) by the purchaser of this material requires an additional agreement with FM Approvals (formerly Factory Mutual Research).

### Hazard Rating System

#### NFPA

Health	Flammability	Instability
1	1	0

### Revision

Identification Number: 177669 / A001 / Issue Date: 06/28/2021 / Version: 12.0

Most recent revision(s) are noted by the bold, double bars in left-hand margin throughout this document.

### Full text of other abbreviations

AllC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CERCLA - Comprehensive Environmental Response, Compensation, and Liability Act; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DOT - Department of Transportation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; EHS - Extremely Hazardous Substance; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; HMIS - Hazardous Materials Identification System; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; MSHA - Mine Safety and Health Administration; n.o.s. - Not Otherwise Specified; NFPA - National Fire Protection Association; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; RCRA - Resource Conservation and Recovery Act; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; RQ - Reportable Quantity; SADT - Self-Accelerating Decomposition Temperature; SARA - Superfund Amendments and Reauthorization Act; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative

### Information Source and References

This SDS is prepared by Product Regulatory Services and Hazard Communications Groups from information supplied by internal references within our company.

